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EXAMINER

POON, KING Y

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**BEFORE THE BOARD OF PATENT APPEALS  
AND INTERFERENCES**

Paper No. 17

Application Number: 09/610404

Filing Date: 07/05/2000

Appellant(s): Barry Richard Cavill et al.

**MAILED**

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Technology Center 2600

Geoffrey L. Oberhaus  
For Appellant

**EXAMINER'S ANSWER**

This is in response to appellant's brief on appeal filed 3/11/2003.

**(1) *Real Party in Interest***

A statement identifying the real party in interest is contained in the brief.

**(2) *Related Appeals and Interferences***

A statement identifying the related appeals and interferences which will directly affect or be directly affected by or have a bearing on the decision in the pending appeal is contained in the brief.

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**(3) *Status of Claims***

The statement of the status of the claims contained in the brief is correct.

**(4) *Status of Amendments After Final***

The appellant's statement of the status of amendments after final rejection contained in the brief is correct.

**(5) *Summary of Invention***

The summary of invention contained in the brief is correct.

**(6) *Issues***

The appellant's statement of the issues in the brief is correct.

**(7) *Grouping of Claims***

Appellant's brief includes a statement that claims group A (claims 1, 3-5, 7-20), group B (claim 2), and group C (claim 6) do not stand or fall together and provides reasons as set forth in 37 CFR 1.192(c)(7) and (c)(8).

**(8) *ClaimsAppealed***

The copy of the appealed claims contained in the Appendix to the brief is correct.

**(9) *Prior Art of Record***

The following is a listing of the prior art of record relied upon in the rejection of claims under appeal.

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4,751,583	Levine	06-1988
4,965,748	Chang et al.	10-1990

**(10) *Grounds of Rejection***

The following ground(s) of rejection are applicable to the appealed claims:

Claims 1, 3-5, 7-20 are rejected under 35 U.S.C. 102(e) as being anticipated by Itoh.

(U.S. Patent # 6,034,785).

Regarding claim 1: Itoh teaches a method of processing a digital photographic image (column 6, line 40, column 7, lines 40-45) on a photoprinter, (10, fig. 1) comprising: receiving a digital photographic image (the image scanned in by the scanner 12, column 7, lines 40-45) in a first format (the resolution that is before converted to 300 dpi, column 14, lines 40-45) on a printer; (10, fig. 1) performing one or more first operations (image processing, column 14, line 42) on the digital photographic image in the first format; (see the image is processed before being converted into 300 dpi, column 14, lines 40-45) converting the digital photographic image to a second format; (300 dpi, column 14, lines 40-45) and performing one or more second operations on the digital photographic image in the second format. (Synthesized, column 14, lines 1-10).

Regarding claim 3: Itoh teaches rendering the digital photographic image for output on the printer. (Column 10, lines 60-67).

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Regarding claim 4: Itoh teaches wherein the first operations include one or more photographic image alterations. (Column 8, lines 45-50).

Regarding claim 5: Itoh teaches wherein the second operations include: one or more text insertions onto the digital photographic image; (predetermined sentence, column 12, lines 45-50) and one or more graphical (the object of previously prepared picture, column 12, lines 45-50) insertions onto the digital photographic image.

Regarding claim 7: Itoh teaches wherein the second format is a printer resolution format. (Column 14, lines 1-5)

Regarding claim 8: Itoh teaches selecting means (processing device, column 8, lines 45-50) set processing condition selected by a user using an input device, 22, fig. 1) for selectively performing a third operation (color correction, column 8, lines 49) on the digital photographic image in the first format.

Regarding claim 9: Itoh teaches selecting means for selectively (program of controller 14 used to control input device 22 to select the image selected by users to be synthesized, column 6, lines 5-40) performing a fourth operation (synthesizing a name, column 6, line 29) on the digital photographic image in the second format.

Regarding claim 10: Itoh teaches a photoprinter (10, fig. 1) capable of processing a digital photographic image at two resolutions, (the resolution that is before converted to 300 dpi, column 14, lines 40-45, and 300 dpi, column 14, lines 40-45) comprising: a first memory (frame memory 46, fig. 2, and column 14, lines 41) in a first format; (see the image is processed before being

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converted into 300 dpi, column 14, lines 40-45); a second memory (memory 20, column 12, lines 44-55) in a second format; and a controller (CPU 40, column 10, lines 15-35) wherein the controller performs one or more first operations (column 8, lines 45-50) on a digital photographic image in the first memory and one or more second operations (Synthesized, column 14, lines 1-10) on the digital photographic image in the second memory.

Regarding claim 11: Itoh teaches means (control program of CPU 40 used to perform converting images data to the printer resolution, column 14, lines 40-45) for converting the digital photographic image in the first memory in the first format to the second format for storage in the second memory.

Regarding claim 12: Itoh teaches rendering the digital photographic image for output to a paper medium. (Column 10, lines 60-67, column 23, line 29).

Regarding claim 13: Itoh teaches rendering the digital photographic image for output to a computer readable medium. (42, column 10, lines 1-5)

Regarding claim 14: Itoh teaches the first format is a native resolution format of the digital photographic image (column 7, lines 5-20) and the second format is a printer resolution format. (Column 14, lines 1-5).

Regarding claim 15: Itoh teaches wherein the first operations include one or more digital photographic image alterations. (See magnification, column 8, lines 45-50)

Regarding claim 16: Itoh teaches wherein the second operations include one or more text insertions (predetermined sentence, column 12, lines 45-50) and one or more graphical (the

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object of previously prepared picture, column 12, lines 45-50) insertions onto the digital photographic image.

Regarding claim 17: Itoh teaches a method of providing data management (abstract) on a photoprinter (10, fig. 1) comprising: receiving a digital photographic image (the image scanned in by the scanner 12, column 7, lines 40-45) in a first format; (the resolution that is before converted to 300 dpi, column 14, lines 40-45) on a printer; (10, fig. 1) storing the digital photographic image in a first memory (frame memory 46, column 8, lines 20-36) in the first format; (see the image is stored before being converted into 300 dpi, column 14, lines 40-45) performing one or more first operations on the digital photographic image in the first memory; (column 8, lines 45-50) converting the digital photographic image to a second format; (300dpi, column 14, lines 40-45) transferring and storing the digital photographic image in the second format to a second memory; (memory 20, column 12, lines 44-55) and performing one or more second operations on the digital photographic image in the second memory. (Synthesized, column 14, lines 1-10).

Regarding claim 18: Itoh teaches rendering the digital photographic image for output. (Column 10, lines 60-67).

Regarding claim 19: Itoh teaches, wherein the first format is at a lower resolution format than the second format. (Inherent properties of Itoh. When Itoh teaches converting scanned images into printer resolution, column 14, lines 1-10, the scanned images can only be with a resolution of higher, lower or the same compare to the printer resolution.)

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Regarding claim 20: Itoh teaches, wherein the first operations include digital photographic image alterations (column 8, lines 45-50) and the second operations include text (predetermined sentence, column 12, lines 45-50) and graphical insertions (the object of previously prepared picture, column 12, lines 45-50) on the digital photographic image.

Claim 2 is rejected under 35 U.S.C. 103(a) as being unpatentable over Itoh as applied to claim 1 and further in view of Chang et al. (U.S. Patent # 4,965,748).

Regarding claim 2: Itoh teaches storing the digital photographic image while in the first format in an image-storage buffer; (frame memory 46, fig. 2, and column 14, lines 41) and storing the digital photographic image while at the second format in a memory. (memory 20, column 12, lines 44-55)

Itoh does not teach to use a print band buffer to store the image data at the second format.

Chang et al., in the same area of storing image data to be printed by a printer, teaches to store image data using a print band buffer. (Column 1, lines 40-45, and column 1, lines 65).

Therefore, it would have been obvious to a person with ordinary skill in the art at the time the invention was made to have modified Itoh by: using a print band buffer to store the image data at the second format.

It would have been obvious to a person with ordinary skill in the art at the time the invention was made to have modified Itoh by the teaching of Chang et al. because of the following reasons: (a) using a band buffer would have reduced the memory size of the printer, as taught by

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Chang et el. at column 1, lines 40-45; (b) using a smaller memory would have reduced the cost of the printer; and (c) using a smaller memory would have reduced the size of the circuitry for the printer.

Claim 6 is rejected under 35 U.S.C. 103(a) as being unpatentable over Itoh as applied to claim 1 and further in view of Levine. (U.S. Patent # 4,751,583).

Regarding claim 6: Itoh teaches wherein the first format is a scanner resolution format. (Column 7, lines 10-20).

Itoh does not teach that the resolution format is in a camera resolution format. Levine, in the same area of printing photographic images teaches to input images from a camera, (fig. 1) with a camera resolution format, (column 4, lines 15-30) to be processed by a processor, (14, fig. 1) for printing.

Therefore, it would have been obvious to a person with ordinary skill in the art at the time the invention was made to have modified Itoh by: replacing scanner with a camera such that resolution format is in a camera resolution format.

It would have been obvious to a person with ordinary skill in the art at the time the invention was made to have modified Itoh by the teaching of Levine because of the following reasons (a) a camera would have provided the user with a better quality image and with a higher resolution, as taught by Levine at column 4, lines 15-30; and (b) a better quality image would have created a better picture or printout or print product for the users.

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**(11) Response to Argument**

Appellant, on page 7, brief, argues that Itoh fails to disclose a printer that, independent of an external host, is capable of performing a first operation on a digital photographic image in a first format and a second operation on the digital photographic image in a second format.

In response: Itoh teaches a printer, (10, fig. 1, fig. 2, digital print system, column 6, line 4), independent of an external host device/computer, (the image processing is performed in the internal controller 14 of the digital print system, column 7, lines 40-60, which is not an external host of the print system 10), is capable of performing a first operation (e.g., turns over the main scan image or correct color and gradation of the main scan image, column 8, lines 50-64, column 14, lines 40-43) on a digital photographic image (the main scan image digital image (column 8, line 53) of a film, column 8, lines 35-39) in a first format (the resolution that is before being converted to 300 dpi, column 14, lines 40-45) and a second operation (synthesized with other images such as character, column 14, lines 55-61) on the digital photograph image in a second format. (F4, fig. 4, synthesize (image combination) is using converted resolution of scanned images F2)

Appellant, on bottom of page 7, brief, argues that Itoh has nothing to do with photoprinters.

In response: Column 7, lines 10-20, clearly teaches the printer/print system 10 prints photoelectrically scanned images from a film. Furthermore the image output device of the

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printer 10 prints images onto a photosensitive material, column 6, lines 13-15. Therefore, printer 10 of Itoh is a photoprinter.

Appellant, on page 8, brief, argues: a photoprinter is a stand-alone appliance for printing digital photographs onto a printable medium; stand-alone is defined to be a printer that is capable of processing and printing digital files independent of an external host; and Itoh's print system 10 is not a photoprinter.

In response: In order to be classified as being a stand-alone printer, the printer only needs to be capable of processing and printing digital files independent of an external host.

See bottom of page 5 and top of page 6, specification, appellant.

Itoh's printer/print system 10 is capable of processing and printing digital files (for example, the digital template file, column 12, line 44-45) independent of an external host computer. (Controller 14 is part of the printer/print system and is not an external host computer, fig. 1, column 6, lines 4-13) Therefore, the printer/print system 10, Itoh, is a stand-alone printer/print system.

Appellant, on bottom of page 8, and page 9 brief, argues that, in Itoh, printer 16 depends on an external controller 14; therefore, Itoh does not teach a printer that is capable of processing and printing digital files independent of an external host.

Printer 16 and controller 14, Itoh, fig. 1, and 2, are both internal components of the printer/print system 10. Controller 14 is not an external component of printer/print system 10.

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Itoh's printer/print system 10 is capable of processing and printing digital files (for example, the digital template file, column 12, line 44-45) independent of an external host computer. (Controller 14 is part of the printer/print system and is not an external host computer, fig. 1, column 6, lines 4-13)

Fig.4, in the appellant's drawing/diclosure, shows a printer 1300, and a printer controller 700. It is clear from the drawing/disclosure that printer 1300 is not printer controller 700, and vice versa. It is also clear from the drawing/disclosure that Printer controller 700 is external to printer 1300. However, printer 1300 and controller 700 are both internal components of a photoprinter. The examiner is comparing printer 16, Itoh, to the printer 1300, appellant; and controller 14, Itoh, to the printer controller 700, appellant.

Appellant, on bottom of page 9, and page 10, brief, argues that, printer controller 700 and printer 1300 are internal components of a stand-alone appliance, not separate devices of a print system, such as Itoh.

In response: Page 11, lines 12-15, specification, appellant, clearly disclosed a photoprinter comprising a printer controller 700 and a printer 1300. The printer controller 700 is a software logic residing in the photoprinter's volatile memory during operation and residing in the non volatile memory when the photoprinter is power down.

From the appellant's disclosure, it is clear that the photoprinter has at least a volatile memory, a non volatile memory and a printer. It is also clear to a person with ordinary skill in the art that a volatile memory is a physical device for storing data volatiley, a non volatile

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memory is another physical device for storing data non volatiley, and a printer is third device that prints images.

For example, a person goes to an electronic store and asks a store manager for a non volatile memory, the person would not expect the manager to give him a printer or a volatile memory because a printer, a volatile memory and a non volatile memory are such distinct and separate devices that a person with ordinary skill in the art should not be confused between a printer device, a volatile memory device and a non volatile memory device. Therefore, the printer, the volatile memory and the non volatile memory, in the stand-alone appliance of appellant, are internal separate components/devices of a print system.

Appellant, on page 10, brief, argues appellant's specification, page 5, lines 21-23, defines a photoprinter to be a stand-alone appliance, and not a system of separate devices.

In response: Appellant defines the photoprinter as a stand-alone appliance, wherein stand-alone means the printer is capable of processing and printing digital files independent of an external host device. Appellent's specification does not define that the photoprinter is not a system of separate/different devices.

Fig. 4, and page 11, lines 12-15, appellant's specification, defines the photoprinter is a system of separate/different devices such as a volatile memory device, a non volatile memory device, and a printer device.

Appellant, on page 10, brief, argues page 1, lines 15-21, appellant's specification teaches a photoprinter that does not use separate devices.

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In response: Page 1, lines 15-21, appellant's specification teaches to print without using a computer. Fig. 4, and page 11, lines 12-15, appellant's specification further teaches to print using an internal controller of a print system, the print system comprising at least a volatile memory device, a non volatile memory device, and a printer device.

As previously discussed, Itoh teaches to print without using an external computer. Instead, Itoh teaches to use an internal controller 14 of a digital print system for printing. (Fig. 1, fig. 2)

Furthermore, Itoh teaches a printer, (10, fig. 1, fig. 2, digital print system, column 6, line 4), independent of an external host device/computer, (the image processing is performed in the internal controller 14 of the digital print system, column 7, lines 40-60, which is not an external host of the print system 10), is capable of performing a first operation (e.g., turns over the main scan image or correct color and gradation of the main scan image, column 8, lines 50-64, column 14, lines 40-43) on a digital photographic image (the main scan image digital image (column 8, line 53) of a film, column 8, lines 35-39) in a first format (the resolution that is before converted to 300 dpi, column 14, lines 40-45) and a second operation (synthesized with other images such as character, column 14, lines 55-61) on the digital photograph image in a second format. (F4, fig. 4, synthesize (image combination) is using converted resolution of scanned images F2)

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Appellant, on page 12, brief, argues there is no *prima facie* case of obviousness established with respect to claim 2 because neither Itoh nor Chang et al. teaches a printer capable of processing and printing digital files independent of an external host device.

In response: Itoh's printer/print system 10 is capable of processing and printing digital files (for example, the digital template file, column 12, line 44-45) independent of an external host computer. (Controller 14 is part of the printer/print system and is not an external host computer, fig. 1, column 6, lines 4-13)

Appellant, on page 15, brief, argues there is no *prima facie* case of obviousness established with respect to claim 6 because neither Itoh nor Levine teaches a printer that, independent of an external host, is capable of performing a first operation on a digital photographic image in a first format and a second operation on the digital photographic image in a second format.

In response: Itoh teaches a printer, (10, fig. 1, fig. 2, digital print system, column 6, line 4), independent of an external host device/computer, (the image processing is performed in the internal controller 14 of the digital print system, column 7, lines 40-60, which is not an external host of the print system 10), is capable of performing a first operation (e.g., turns over the main scan image or correct color and gradation of the main scan image, column 8, lines 50-64, column 14, lines 40-43) on a digital photographic image (the main scan image digital image (column 8, line 53) of a film, column 8, lines 35-39) in a first format (the resolution that is before being converted to 300 dpi, column 14, lines 40-45) and a second operation (synthesized with other

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images such as character, column 14, lines 55-61) on the digital photograph image in a second format. (F4, fig. 4, synthesize (image combination) is using converted resolution of scanned images F2)

For the above reasons, it is believed that the rejections should be sustained.

Respectfully submitted,

King Y. Poon

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